WHAT IS CLAIMED IS:

1. A method, comprising:

designating a first portion of a virtual memory space as an unreserved portion which is conditionally accessible by a class of memory users which includes at least one memory user wherein said unreserved portion is mapped to physical memory space;

designating a second portion of said virtual memory space as a reserved portion which is conditionally unavailable for use by any memory user of said class of memory users; and

converting a subportion of one of said unreserved portion and said reserved portion to a subportion of the other of said unreserved portion and said reserved portion.

2. The method of claim 1 further comprising allocating a buffer subportion of the unreserved portion of said virtual memory space for use as a buffer memory by a memory user of said class of memory users.

3. The method of claim 2 wherein said allocating includes changing a bit of a bitmap representing said unreserved portion to indicate that said buffer subportion is allocated to a memory user.

4. The method of claim 3 further comprising subsequently unallocating said buffer subportion so that said buffer subportion is available to be allocated to a user of said class of memory users.

5. The method of claim 4 wherein said unallocating includes changing a bit of a bitmap representing said unreserved portion to indicate that said buffer subportion is available to be allocated to a user of said class of memory users.

6. The method of claim 1 wherein said converting includes converting a subportion of said unreserved portion to a subportion of said reserved portion.

7. The method of claim 1 wherein said converting includes converting a subportion of said reserved portion to a subportion of said unreserved portion.

8. The method of claim 1 wherein said reserved and unreserved portions are contiguous in said virtual memory space and the boundary between said reserved and unreserved portions is represented by a virtual memory address and wherein said converting includes changing the virtual memory address of the boundary.

9. The method of claim 1 wherein said class of memory users are users of a send and receive agent.

10. The method of claim 1 wherein said physical memory is a part of a host memory.

11. The method of claim 1 wherein said reserved portion is not mapped to physical memory space.

12. An article comprising a storage medium, the storage medium comprising machine readable instructions stored thereon to:

designate a first portion of a virtual memory space as an unreserved portion which is conditionally accessible by a class of memory users which includes at least one memory user wherein said unreserved portion is mapped to physical memory space;

designate a second portion of said virtual memory space as a reserved portion which is conditionally unavailable for use by any memory user of said class of memory users; and

convert a subportion of one of said unreserved portion and said reserved portion to a subportion of the other of said unreserved portion and said reserved portion.

13. The article of claim 12 wherein the storage medium further comprises machine readable instructions stored thereon to allocate a buffer subportion of the unreserved portion of said virtual memory space for use as a buffer memory by a memory user of said class of memory users.

14. The article of claim 13 wherein the machine readable instructions to allocate include machine readable instructions stored on the storage medium to change a bit of a bitmap representing said unreserved portion to indicate that said buffer subportion is allocated to a memory user.

15. The article of claim 14 wherein the storage medium further comprises machine readable instructions stored thereon to subsequently unallocate said buffer subportion so that said buffer subportion is available to be allocated to a user of said class of memory users.

16. The article of claim 15 wherein the machine readable instructions to unallocate include machine readable instructions stored on the storage medium to change a bit of a bitmap representing said unreserved portion to indicate that said buffer subportion is available to be allocated to a user of said class of memory users.

17. The article of claim 12 wherein the machine readable instructions to convert include machine readable instructions stored on the storage medium to convert a subportion of said unreserved portion to a subportion of said reserved portion.

18. The article of claim 12 wherein the machine readable instructions to convert include machine readable instructions stored on the storage medium to convert a subportion of said reserved portion to a subportion of said unreserved portion.

19. The article of claim 12 wherein said reserved and unreserved portions are contiguous in said virtual memory space and the boundary between said reserved and unreserved portions is represented by a virtual memory address and wherein the machine readable instructions to convert include machine readable instructions stored on the storage medium to change the virtual memory address of the boundary.

20. The article of claim 12 wherein said class of memory users are users of a send and receive agent.

21. The article of claim 12 wherein said physical memory is a part of a host memory.

22. The article of claim 12 wherein said reserved portion is not mapped to physical memory space.

23. A system, comprising:

a virtual memory space comprising a plurality of memory addresses;

a physical memory which includes data storage, said physical memory having a physical memory space comprising a plurality of physical memory addresses;

a processor coupled to the physical memory;

a network controller which includes a class of physical memory users which includes at least one physical memory user;

a data storage controller for managing Input/Output (I/O) access to the data storage; and

a device driver executable by the processor in the memory, wherein at least one of the device driver and the network controller is adapted to:

(i) designate a first portion of a virtual memory space as an unreserved portion which is conditionally accessible by said class of memory users wherein said unreserved portion is mapped to said physical memory space;

(ii) designate a second portion of said virtual memory space as a reserved portion which is conditionally unavailable for use by any memory user of said class of memory users; and

(iii) convert a subportion of one of said unreserved portion and said reserved portion to a subportion of the other of said unreserved portion and said reserved portion.

24. The system of claim 23 wherein at least one of the device driver and the network controller is further adapted to allocate a buffer subportion of the unreserved portion of said virtual memory space for use as a buffer memory by a memory user of said class of memory users.

25. The system of claim 24 further comprising a bitmap having a plurality of bits representing said unreserved portion and wherein said allocating includes changing a bit of said bitmap representing said unreserved portion to indicate that said buffer subportion is allocated to a memory user.

26. The system of claim 25 wherein at least one of the device driver and the network controller is further adapted to subsequently unallocate said buffer subportion so that said buffer subportion is available to be allocated to a user of said class of memory users.

27. The system of claim 26 wherein said unallocating includes changing a bit of a bitmap representing said unreserved portion to indicate that said buffer subportion is available to be allocated to a user of said class of memory users.

28. The system of claim 23 wherein said converting includes converting a subportion of said unreserved portion to a subportion of said reserved portion.

29. The system of claim 23 wherein said converting includes converting a subportion of said reserved portion to a subportion of said unreserved portion.

30. The system of claim 23 wherein said reserved and unreserved portions are contiguous in said virtual memory space and the boundary between said reserved and unreserved portions is represented by a virtual memory address and wherein said converting includes changing the virtual memory address of the boundary.

31. The system of claim 23 wherein at least one of the device driver and the network controller includes a send and receive agent which includes said class of memory users.

32. The system of claim 23 further comprising a host memory and said physical memory is a part of a host memory.

33. The system of claim 23 wherein said reserved portion is not mapped to said physical memory space.

34. The system of claim 23 for use with an unshielded twisted pair cable, said system further comprising an Ethernet data transceiver coupled to said network controller and said cable and adapted to transmit and receive data over said cable.

35. The system of claim 23 further comprising a video controller coupled to said processor.

36. A network adapter for use with a system which includes a virtual memory space comprising a plurality of memory addresses, a physical memory which includes data storage, said physical memory having a physical memory space comprising a plurality of physical memory addresses; the adapter comprising:

a class of physical memory users which includes at least one physical memory user;

wherein the network adapter is adapted to:

(i) designate a first portion of said virtual memory space as an unreserved portion which is conditionally accessible by said class of memory users wherein said unreserved portion is mapped to said physical memory space;

(ii) designate a second portion of said virtual memory space as a reserved portion which is conditionally unavailable for use by any memory user of said class of memory users; and

(iii) convert a subportion of one of said unreserved portion and said reserved portion to a subportion of the other of said unreserved portion and said reserved portion.

37. The adapter of claim 36 wherein the network adapter is further adapted to allocate a buffer subportion of the unreserved portion of said virtual memory space for use as a buffer memory by a memory user of said class of memory users.

38. The adapter of claim 37 further comprising a bitmap having a plurality of bits representing said unreserved portion and wherein said allocating includes changing a bit of said bitmap representing said unreserved portion to indicate that said buffer subportion is allocated to a memory user.

39. The adapter of claim 38 wherein the network adapter is further adapted to subsequently unallocate said buffer subportion so that said buffer subportion is available to be allocated to a user of said class of memory users.

40. The adapter of claim 36 wherein said reserved and unreserved portions are contiguous in said virtual memory space and the boundary between said reserved and unreserved portions is represented by a virtual memory address and wherein said converting includes changing the virtual memory address of the boundary.

41. The adapter of claim 36 wherein said reserved portion is not mapped to said physical memory space.